

AMENDMENTS TO THE CLAIMS

1. (Currently Amended) A diode-pumped solid-state laser device used to side-pump a laser rod, wherein:

a cooling tube to cool said laser rod with the use of flowing water is provided coaxially so as to surround said laser rod; and

said cooling tube is provided with an antireflection area for pumping light on a portion of an outer surface thereof, and with a high reflection area for the pumping light on another portion of the outer surface on which said antireflection area is absent wherein the antireflection area is not a hole through the cooling tube.

2. (Original) The diode-pumped solid-state laser device according to claim 1, wherein:

a pumping laser diode is placed in such a manner so as to prevent an optical axis of the, pumping light that passes through said antireflection area and goes incident on said laser rod from intersecting with a central axis of said laser rod.

3. (Original) The diode-pumped solid-state laser device according to claim 2, wherein:

said antireflection area is provided to a plurality of places along a circumferential direction of said outer surface.

4. (Original) The diode-pumped solid-state laser device according to claim 3, wherein:

said antireflection area is provided to said plurality of places at equal intervals along the circumferential direction.

5. (Previously Presented) The diode-pumped solid-state laser device according to claim 3, wherein:

said antireflection area comprises an antireflection coating; and said high reflection area comprises a high reflection coating.

6. (Original) The diode-pumped solid-state laser device according to claim 5, wherein:

said high reflection coating is covered with said antireflection coating.

7. (Original) The diode-pumped solid-state laser device according to claim 5, wherein:

said antireflection area includes said antireflection coating alone; and

said high reflection area includes said high reflection coating on said antireflection coating.

8. (Original) The diode-pumped solid-state laser device according to claim 3, wherein:

said cooling tube is further provided with a scattering surface on an inner surface thereof.

9. (Original) The diode-pumped solid-state laser device according to claim 3, wherein:

a scattering surface is provided on an outer surface of said high reflection area.

10. (Currently Amended) A manufacturing method of a diode-pumped solid-state laser device used to side-pump a laser rod, in which a cooling tube to cool said laser rod with the use of flowing water is provided coaxially so as to surround said laser rod, said method comprising:

a step of providing said cooling tube with an antireflection area for pumping light on a portion of an outer surface thereof, the antireflection area is not being a hole through the cooling tube; and

a step of providing said cooling tube with a high reflection area for the pumping light on another portion of the outer surface on which said antireflection area is absent.

11. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 10, further comprising:

a step of placing a pumping laser diode in such a manner so as to prevent an optical axis of the pumping light that passes through said antireflection area and goes incident on said laser rod from intersecting with a central axis of said laser rod.

12. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 11, wherein:

said antireflection area is provided to a plurality of places along a circumferential direction of said outer surface.

13. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 12, wherein:

said antireflection area is provided to said plurality of places at equal intervals along the circumferential direction.

14. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 12, wherein:

said antireflection area comprises a anti-reflection coating; and
said high reflection area comprises a high reflection coating.

15. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 14, wherein:

said high reflection coating is covered with said anti-reflection coating.

16. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 14, wherein:

said antireflection area includes said anti-reflection coating alone; and
said high reflection area includes said high reflection coating on said anti-reflection coating.

17. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 12, further comprising:

a step of providing a scattering surface on an inner surface of said cooling tube.

18. (Original) The manufacturing method of a diode-pumped solid-state laser device according to claim 12, further comprising:

a step of providing a scattering surface on an outer surface of said high reflection area.